

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

1. (Previously Presented) A method of evaluating the reflection performance of a reflecting mirror designed for a vehicle lamp, comprising:

a) entering design information and position information, the design information representing a plurality of reflecting basic surfaces which constitute the reflecting mirror, and the position information containing a light source position in the vehicle lamp; and

b) displaying attribute information concerning an attribute indicative of whether imaginary light from the light source position can effectively reach each of a first plurality of areas into which a first reflecting basic surface, selected from among the plurality of reflecting basic surfaces, is divided on the basis of the design information;

wherein the plurality of reflecting basic surfaces are discrete surfaces.

2. (Previously Presented) The method according to claim 1, further comprising:

c) displaying attribute information concerning an attribute indicative of whether imaginary light from the light source position can effectively reach each of a second plurality of areas into which each of the remaining reflecting basic surfaces is divided on the basis of the design information.

3. (Previously Presented) The method according to claim 1, further comprising:

d) generating divided area information so as to be associated with the design information, the divided area information being indicative of a the first plurality of areas of the first reflecting basic surface selected from among the plurality of reflecting basic surfaces and divided into the first plurality of areas on the basis of the design information;

e) making a determination, on the basis of the divided area information and the design information, as to whether the imaginary light from the light source position can effectively reach each of the first plurality of areas of the first reflecting basic surface; and

f) generating the attribute information for each of the first plurality of areas on the basis of the determination, the attribute information being associated with at least one of the design information and the divided area information.

4. (Previously Presented) The method according to claim 3, further comprising:

g) applying (d) to a second reflecting basic surface sequentially selected from the remaining reflecting basic surfaces to update the divided area information, the divided area information being associated with the design information;

h) applying (e) and (f) to the second reflecting basic surface sequentially selected from the remaining reflecting basic surfaces to update the attribute information, the attribute information being associated with at least one of the design information and the divided area information; and

i) displaying the updated attribute information concerning the attribute with respect to each of the plurality of areas into which each of the remaining reflecting basic surfaces is divided on the basis of the design information.

5. (Currently Amended) A method according to claim 1, wherein (b) includes: providing an evaluation point within each of the first plurality of areas;

generating a straight line, the straight line connecting the evaluation point to the light source position; and

~~making a determination as to~~ determining whether the straight line intersects another reflecting basic surface other than the first reflecting basic surface which is associated with the first plurality of areas.

6. (Previously Presented) An evaluation system for evaluating reflection performance of a reflecting mirror designed for a vehicle lamp, comprising:

a memory;

a display device which displays received information;

input means for entering design information and position information of a light source position in the vehicle lamp to store the entered information in the memory, the design information being indicative of a plurality of reflecting basic surfaces which constitute the reflecting mirror; and

first transmitting means for transmitting, to the display device, attribute information concerning an attribute indicative of whether imaginary light from the light source position can effectively reach each of a first plurality of areas into which a first reflecting basic surface, selected from among the reflecting basic surfaces, is divided on the basis of the design information;

wherein the plurality of reflecting basic surfaces are discrete surfaces.

7. (Previously Presented) The evaluation system according to claim 6, further comprising:

second transmitting means for transmitting, to the display device, attribute information concerning an attribute indicative of whether imaginary light from the light source position can effectively reach each of a second plurality of areas into which each of the remaining reflecting basic surfaces is divided on the basis of the design information.

8. (Previously Presented) The evaluation system according to claim 6, further comprising:

first division means for generating divided area information so as to be associated with the design information, the divided area information including area data on a the first plurality of areas; of the first reflecting basic surface selected from among the reflecting basic surfaces and is divided into the first plurality of areas on the basis of the design information;

first determination means for making a determination, on the basis of the divided area information and the design information, as to whether the imaginary light from the light source position can effectively reach each of the first plurality of areas of the first reflecting basic surface; and

first attribute means for generating, on the basis of the determination, the attribute information for each of the first plurality of areas, the attribute information being associated with at least one of the design information and the divided area information.

9. (Previously Presented) A computer-readable storage medium storing a program to be executed by a computer, the program enabling the computer to evaluate reflection performance of a reflecting mirror designed for a vehicle lamp, wherein the program includes:

an input process for entering design information and position information of a light source position in the vehicle lamp, the design information being indicative of a plurality of reflecting basic surfaces, the plurality of reflecting basic surfaces constituting the reflecting mirror; and

a first display process for displaying attribute information concerning an attribute indicative of whether imaginary light from the light source position can effectively reach each of a first plurality of areas into which a first reflecting basic surface, selected from among the plurality of reflecting basic surfaces, is divided on the basis of the design information;

wherein the plurality of reflecting basic surfaces are discrete surfaces.

10. (Previously Presented) The storage medium according to claim 9, wherein the program further comprises:

a second process for displaying attribute information concerning an attribute indicative of whether imaginary light from the light source position can effectively reach each of a second plurality of areas into which each of the remaining reflecting basic surfaces is divided on the basis of the design information.

11. (Previously Presented) The storage medium according to claim 9, wherein the program further includes:

a first division process for generating divided area information, the divided area information including area data on a the first plurality of areas of the first reflecting basic surface selected from among the reflecting basic surfaces, the divided area information being associated with the design information;

a first determination process for making a determination, on the basis of the divided area information and the design information, as to whether the imaginary light from the light source position can effectively reach each of the first plurality of areas of the first reflecting basic surface; and

a first attribute process for generating the attribute information for each of the first plurality of areas on the basis of the basis of the determination, the attribute information being associated with at least one of the design information and the divided area information.

12. (Previously Presented) The storage medium according to claim 9, wherein the program further includes:

a division process provided so as to generate divided area information, the divided area information including area data on a second plurality of areas; into which each of the reflecting basic surfaces is divided on the basis of the design information, the divided area information being associated with the design information;

a determination process provided so as to make a determination, on the basis of the divided area information and the design information, as to whether imaginary light from the light source position can effectively reach of the second plurality of areas of each of the reflecting basic surfaces;

an attribute process provided so as to generate, on the basis of the determination, the attribute information for each of the second plurality of areas of each reflecting basic surface, the attribute information being associated with at least one of the design information and the divided area information; and

another display process provided so as to display the attribute information for each of the second plurality of areas into which each of the remaining reflecting basic surfaces is divided on the basis of the design information.

13. (New) The method according to claim 1, wherein the first plurality of areas into which a first reflecting basic surface is divided are equally sized and repetitively arranged.

14. (New) The method according to claim 1, wherein the plurality of reflecting basic surfaces are non-continuous.

15. (New) The evaluation system according to claim 8, wherein the first determination means makes the determination of whether the imaginary light from the light source can effectively reach each of the first plurality of areas by:

providing an evaluation point within each of the first plurality of areas;

generating a straight line, the straight line connecting the evaluation point to the light source position; and

determining whether the straight line intersects another reflecting basic surface other than the first reflecting basic surface which is associated with the first plurality of areas.

16. (New) The evaluation system according to claim 6, wherein the first plurality of areas into which a first reflecting basic surface is divided are equally sized and repetitively arranged.

17. (New) The evaluation system according to claim 6, wherein the plurality of reflecting basic surfaces are non-continuous.

18. (New) The storage medium according to claim 11, wherein the first determination process makes the determination as to whether the imaginary light from the light source can effectively reach each of the first plurality of areas by:

providing an evaluation point within each of the first plurality of areas;
generating a straight line, the straight line connecting the evaluation point to the light source position; and
determining whether the straight line intersects another reflecting basic surface other than the first reflecting basic surface which is associated with the first plurality of areas.

19. (New) The storage medium according to claim 9, wherein the first plurality of areas into which a first reflecting basic surface is divided are equally sized and repetitively arranged.

20. (New) The storage medium according to claim 9, wherein the plurality of reflecting basic surfaces are non-continuous.